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APPL NO.	FILING OR 371 (c) DATE	ART UNIT	FIL FEE REC'D	ATTY.DOCKET NO	DRAWINGS	TOT CLMS	IND CLMS
10/565,446	07/13/2006	1614	1030	753-61 PCT/US		18	1

CONFIRMATION NO. 9882

23869
HOFFMANN & BARON, LLP
6900 JERICHO TURNPIKE
SYOSSET, NY 11791

SEP 11 2006

FILING RECEIPT

OC000000020299715

Date Mailed: 09/06/2006

Receipt is acknowledged of this regular Patent Application. It will be considered in its order and you will be notified as to the results of the examination. Be sure to provide the U.S. APPLICATION NUMBER, FILING DATE, NAME OF APPLICANT, and TITLE OF INVENTION when inquiring about this application. Fees transmitted by check or draft are subject to collection. Please verify the accuracy of the data presented on this receipt. **If an error is noted on this Filing Receipt, please mail to the Commissioner for Patents P.O. Box 1450 Alexandria Va 22313-1450. Please provide a copy of this Filing Receipt with the changes noted thereon. If you received a "Notice to File Missing Parts" for this application, please submit any corrections to this Filing Receipt with your reply to the Notice. When the USPTO processes the reply to the Notice, the USPTO will generate another Filing Receipt incorporating the requested corrections (if appropriate).**

Applicant(s) Beat
~~Beal~~ Weber, Zofingen, SWITZERLAND;
Schäfer Norbert ~~Scharer~~, Oberentfelden, SWITZERLAND;
Beat W. ~~Muller~~, Therwil, SWITZERLAND;
Müller

Power of Attorney: The patent practitioners associated with Customer Number **23869**.

Domestic Priority data as claimed by applicant

This application is a 371 of PCT/~~CH04/00408~~ 06/29/2004
CH2004/000408

Foreign Applications

1274/03
SWITZERLAND ~~12874/03~~ 07/21/2003

If Required, Foreign Filing License Granted: 09/04/2006

The country code and number of your priority application, to be used for filing abroad under the Paris Convention, is US10/565,446

Projected Publication Date: 12/14/2006

Non-Publication Request: No

Early Publication Request: No

Title

Method for production ~~$g(a),$g(b)~~ α, β or alpha, beta-unsaturated amide compounds

Preliminary Class

514

PROTECTING YOUR INVENTION OUTSIDE THE UNITED STATES

Since the rights granted by a U.S. patent extend only throughout the territory of the United States and have no effect in a foreign country, an inventor who wishes patent protection in another country must apply for a patent in a specific country or in regional patent offices. Applicants may wish to consider the filing of an international application under the Patent Cooperation Treaty (PCT). An international (PCT) application generally has the same effect as a regular national patent application in each PCT-member country. The PCT process **simplifies** the filing of patent applications on the same invention in member countries, but **does not result** in a grant of "an international patent" and does not eliminate the need of applicants to file additional documents and fees in countries where patent protection is desired.

Almost every country has its own patent law, and a person desiring a patent in a particular country must make an application for patent in that country in accordance with its particular laws. Since the laws of many countries differ in various respects from the patent law of the United States, applicants are advised to seek guidance from specific foreign countries to ensure that patent rights are not lost prematurely.

Applicants also are advised that in the case of inventions made in the United States, the Director of the USPTO must issue a license before applicants can apply for a patent in a foreign country. The filing of a U.S. patent application serves as a request for a foreign filing license. The application's filing receipt contains further information and guidance as to the status of applicant's license for foreign filing.

Applicants may wish to consult the USPTO booklet, "General Information Concerning Patents" (specifically, the section entitled "Treaties and Foreign Patents") for more information on timeframes and deadlines for filing foreign patent applications. The guide is available either by contacting the USPTO Contact Center at 800-786-9199, or it can be viewed on the USPTO website at http://www.uspto.gov/web/offices/pac/doc/general/index.html.

For information on preventing theft of your intellectual property (patents, trademarks and copyrights), you may wish to consult the U.S. Government website, http://www.stopfakes.gov. Part of a Department of Commerce initiative, this website includes self-help "toolkits" giving innovators guidance on how to protect intellectual property in specific countries such as China, Korea and Mexico. For questions regarding patent enforcement issues, applicants may call the U.S. Government hotline at 1-866-999-HALT (1-866-999-4158).

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Title 35, United States Code, Section 184
Title 37, Code of Federal Regulations, 5.11 & 5.15

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IFW

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant(s)	Weber et al.	Examiner:	Unassigned
Application No.:	10/565,446	Group Art Unit:	1614
Confirmation No.:	9882	Docket:	753-61 PCT/US
Filed:	January 20, 2006	Dated:	December 5, 2006
For:	METHOD FOR PRODUCTION OF α, β-UNSATURATED AMIDE COMPOUNDS		

Commissioner for Patents
P.O. Box 1450
Alexandria, Virginia 22313-1450

I hereby certify this correspondence is being deposited with the United States Postal Service as first class mail, postpaid in an envelope, addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450
On December 5, 2006
Signed: Barbara Thomas/

REQUEST FOR CORRECTED FILING RECEIPT

Sir:

In reviewing the Filing Receipt for the above-identified application, we uncovered several errors. Accordingly, we ask that corrections be made to the Filing Receipt as indicated herein.

With regard to the first listed inventor, the Filing Receipt reads "Beal Weber". The Filing Receipt should read --Beat Weber --.

With regard to the second listed inventor, the Filing Receipt reads "Norbert Scharer". The Filing Receipt should read --Norbert Schärer--, if possible.

With regard to the third listed inventor, the Filing Receipt reads "Beat W. Muller". The Filing Receipt should read --Beat W. Müller--, if possible.

With regard to the domestic priority data, the Filing Receipt incorrectly reads "This application is a 371 of PCT/CH04/00408 06/29/2004". The Filing Receipt should read --This application is a 371 of PCT/CH2004/000408 06/29/2004--.

With regard to the foreign application, the Filing Receipt incorrectly reads "SWITZERLAND 12874/03 07/21/2003". The Filing Receipt should read --SWITZERLAND 1274/03 07/21/2003--.

With regard to the title, the Filing Receipt incorrectly reads "Method for production $g(a), $g(b)-unsaturated amide compounds". The Filing Receipt should read --Method for production of α, β-unsaturated amide compounds--. In the event that it is not possible to indicate the designations "α, β" on the Filing Receipt, please list the title as follows: --Method for production of alpha, beta-unsaturated amide compounds --.

Enclosed is a copy of the cover page of WO 2005/007618 and a copy of the cover pages for the priority document, CH 01274/03, for International Application No. PCT/CH2004/000408, which both evidence the correct international application number and the correct priority data. Also enclosed is a copy of the Preliminary Amendment which was filed with the application. The Preliminary Amendment also evidences the correct domestic and foreign priority data. Additionally, enclosed is a copy of the first-page of the English-language translation of the application as previously filed which evidences the correct title. Furthermore, the copy of the cover page of WO 2005/007618, which is enclosed herewith, evidences the names of the inventors. Moreover, a copy of the Filing Receipt with the above-referenced corrections is provided herewith.

In view of the above, correction of the Filing Receipt is respectfully requested. As the aforementioned errors were due to mistakes by the United States Patent and Trademark Office mistake, Applicants respectfully submit that no fees are required to make these corrections. However, if any fees are required, please charge such fees to Deposit Account No. 08-2461.

If there are any questions with respect to this matter, please direct them to the undersigned.

Respectfully submitted,

Andrea M. Wilkovich.
Registration No.: 53,773

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(973) 331-1700

(12) NACH DEM VERTRAG ÜBER DIE INTERNATIONALE ZUSAMMENARBEIT AUF DEM GEBIET DES PATENTWESENS (PCT) VERÖFFENTLICHTE INTERNATIONALE ANMELDUNG

(19) Weltorganisation für geistiges Eigentum
Internationales Büro

(43) Internationales Veröffentlichungsdatum
27. Januar 2005 (27.01.2005)

PCT

(10) Internationale Veröffentlichungsnummer
WO 2005/007618 A1

(51) Internationale Patentklassifikation[7]: C07C 231/12, C07D 207/38, C07C 233/09

(21) Internationales Aktenzeichen: PCT/CH2004/000408

(22) Internationales Anmeldedatum:
29. Juni 2004 (29.06.2004)

(25) Einreichungssprache: Deutsch

(26) Veröffentlichungssprache: Deutsch

(30) Angaben zur Priorität:
1274/03 21. Juli 2003 (21.07.2003) CH

(71) Anmelder *(für alle Bestimmungsstaaten mit Ausnahme von US)*: **SIEGFRIED GENERICS INTERNATIONAL AG** [CH/CH]; Untere Brühlstrasse 4, CH-4800 Zofingen (CH).

(72) Erfinder; und

(75) Erfinder/Anmelder *(nur für US)*: **WEBER, Beat** [CH/CH]; Wiesenstrasse 4, CH-4800 Zofingen (CH). **SCHÄRER, Norbert** [CH/CH]; Rütiweg 8, CH-5036 Oberentfelden (CH). **MÜLLER, Beat-W.** [CH/CH]; Vogesenstr. 31, CH-4106 Therwil (CH).

(74) Anwalt: **BRAUN, André**; Braun & Partner, Reussstrasse 14, CH-4054 Basel (CH).

(81) Bestimmungsstaaten *(soweit nicht anders angegeben, für jede verfügbare nationale Schutzrechtsart)*: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

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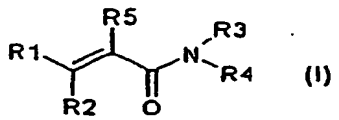
Veröffentlicht:
— *mit internationalem Recherchenbericht*

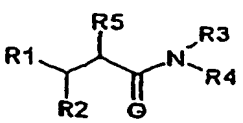
Zur Erklärung der Zweibuchstaben-Codes und der anderen Abkürzungen wird auf die Erklärungen ("Guidance Notes on Codes and Abbreviations") am Anfang jeder regulären Ausgabe der PCT-Gazette verwiesen.

(54) Title: METHOD FOR PRODUCTION OF $G(A),$G(B)-UNSATURATED AMIDE COMPOUNDS

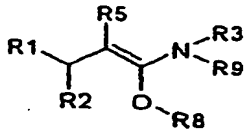
(54) Bezeichnung: VERFAHREN ZUR HERSTELLUNG VON α, β-UNGESÄTTIGTEN AMIDVERBINDUNGEN



(I)



(II)



(III)

(57) Abstract: The invention relates to a method for production of α,β-unsaturated amide compounds of general formula (I): whereby (A) a protective group is introduced into a molecule of general formula (II) to give a compound of formula (III), (B) the compound obtained is reacted in the presence of (i) a dehydrogenation catalyst and (ii) a suitable oxidation agent and (C) the protective groups are removed.

(57) Zusammenfassung: Verfahren zur Herstellung von α, β-ungesättigten Amidverbindungen der allgemeinen Formel (I): idem man (A) in einer Verbindung der allgemeinen Formel (II) : Schutzgruppen einführt, so dass eine Verbindung der allgemeinen Formel (III) entsteht : (B) die erhaltene Verbindung in Gegenwart (i) eines Dehydrierungskatalysators und (ii) eines geeigneten Oxidationsmittels, umsetzt, und (C) die Schutzgruppen entfernt.

WO 2005/007618 A1

PCT/CH 2004/000408

SCHWEIZERISCHE EIDGENOSSENSCHAFT
CONFÉDÉRATION SUISSE
CONFEDERAZIONE SVIZZERA

Bescheinigung

Die beiliegenden Akten stimmen mit den ursprünglichen technischen Unterlagen des auf der nächsten Seite bezeichneten Patentgesuches für die Schweiz und Liechtenstein überein. Die Schweiz und das Fürstentum Liechtenstein bilden ein einheitliches Schutzgebiet. Der Schutz kann deshalb nur für beide Länder gemeinsam beantragt werden.

Attestation

Les documents ci-joints sont conformes aux pièces techniques originales de la demande de brevet pour la Suisse et le Liechtenstein spécifiée à la page suivante. La Suisse et la Principauté de Liechtenstein constituent un territoire unitaire de protection. La protection ne peut donc être revendiquée que pour l'ensemble des deux Etats.

Attestazione

I documenti allegati sono conformi agli atti tecnici originali della domanda di brevetto per la Svizzera e il Liechtenstein specificata nella pagina seguente. La Svizzera e il Principato di Liechtenstein formano un unico territorio di protezione. La protezione può dunque essere rivendicata solamente per l'insieme dei due Stati.

Bern, 29. Juni 2004

Eidgenössisches Institut für Geistiges Eigentum
Institut Fédéral de la Propriété Intellectuelle
Istituto Federale della Proprietà Intellettuale

Patentverfahren
Administration des brevets
Amministrazione dei brevetti

H. Jenni

Heinz Jenni

Hinterlegungsbescheinigung zum Patentgesuch Nr. 01274/03 (Art. 46 Abs. 5 PatV)

Das Eidgenössische Institut für Geistiges Eigentum bescheinigt den Eingang des unten näher bezeichneten schweizerischen Patentgesuches.

Titel:
alpha-beta-ungesättigten Amidverbindungen und Verfahren zu deren Herstellung.

Patentbewerber:
Siegfried Ltd.
Untere Brühlstrasse 4
4800 Zofingen

Vertreter:
Braun & Partner Patent-, Marken-, Rechtsanwälte
Reussstrasse 22
CH-4054 Basel

Anmeldedatum: 21.07.2003

Voraussichtliche Klassen: C07C

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicants: Weber et al.

Application No.: Unassigned

Filed: Herewith (January 20, 2006)

For: METHOD FOR PRODUCTION OF α,β-UNSATURATED AMIDE COMPOUNDS

Confirmation No.: Unassigned

Examiner: Unassigned

Group Art Unit: Unassigned

Docket: 753-61 PCT/US

Dated: January 20, 2006

Date: January 20, 2006 Label No. EV 749 581 415 US

I hereby certify that on the date indicated above I deposited this paper or fee, and any documents indicated as enclosed herewith, with the U.S. Postal Service and that it was addressed for delivery to the Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 by "EXPRESS MAIL POST OFFICE to ADDRESSEE " service.

Kim Tillman/ Kim Tillman
Name (Print) (Signature)

Mail Stop PCT
Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

PRELIMINARY AMENDMENT ACCOMPANYING NATIONAL PHASE FILING UNDER 35 U.S.C. §371

Sir:

Please amend the above-identified application as follows:

Amendments to the specification begin on page 2 of this submission.

Amendments to the claims begin on page 3 of this submission.

Remarks begin on page 9 of this submission.

Amendments to the Specification:

Please add the following immediately after the title of the invention:

CROSS-REFERENCE TO RELATED APPLICATIONS:

This application is the National Stage of International Application No. PCT/CH2004/000408, filed June 29, 2004, which claims the benefit of CH 1274/03, filed July 21, 2003, the contents of which are incorporated by reference herein.

Please add the following header immediately prior to line 3 on page 1 and after the section entitled "Cross-Reference to Related Applications."

FIELD OF THE INVENTION

Please add the following header between lines 7 and 9 on page 1:

SUMMARY OF THE INVENTION

Please add the following header between lines 11 and 13 on page 4:

DETAILED DESCRIPTION OF THE INVENTION

Please add the following header immediately after line 2 on page 12:

EXAMPLES

Please amend the section description for the claims on the top of page 20 as follows:

WHAT IS CLAIMED IS: ~~Patent Claims~~

Please amend the section description on the top of page 27 as follows:

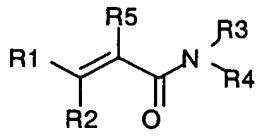
ABSTRACT OF THE DISCLOSURE ~~Summary~~

Express Mail No: EV 749 581 415 US

Amendments to the Claims:

Please amend the claims to read as follows:

1. (Original) Method for the production of α,β-unsaturated amide compounds having the general formula (I):



(I)

wherein,

R_1 and R_2 are independently hydrogen; optionally linear or branched (C_1-C_{18}) alkyl or (C_1-C_{18}) alkenyl substituted with hydroxy, halogen, phenyl, substituted phenyl, or an ester group [-C(O)Oalkyl] or an amide group [-C(O)NH_2 or -C(O)NHalkyl]; optionally phenyl substituted with halogen;

or

R_1 or R_2 comprises a group Y-R_6; in which

Y is oxygen (-O-); sulphur (-S-); -NR_7-; or dialkylsilyloxy [-(alkyl)$_2$Si-O-];

R_6 is hydrogen, optionally linear or branched (C_1-C_{18}) alkyl substituted with hydroxy, halogen, phenyl, substituted phenyl or with an ester group [-C(O)OAlkyl] or an amide group [-C(O)NH_2] or [-C(O)NHAlkyl]; optionally phenyl substituted with halogen;

R_7 is (C_1-C_{18}) alkyl or –N(R_6)(R_7) is a 5- or 6-membered heterocyclic ring;

or

R_1 together with R_3 is directly bonded or a group having the formula -$(CH_2)_n$-; in which

n is a whole number from 1 to 12;

or

R_1 together with R_2 is cyclohexylidene;

or

R_1 together with R_5 and the incorporated (C=C)-double bond is cyclohexenyl;

or

R_1 together with R_5 and the incorporated (C=C)-double bond forms a group of a monounsaturated bicyclic ring;

R_3 is hydrogen, optionally a linear or branched (C_1-C_{12}) alkyl substituted with phenyl, hydroxyl, or halogen, carrying one or more oxygen atoms, (C_5-C_8)-cycloalkyl or (C_5-C_8)-cycloalkenyl, carrying one or more oxygen atoms; preferably, phenyl substituted with halogen or hydroxyl; or R_3 together with R_1 is directly bond or forms a group of the formula -$(CH_2)_n$-;

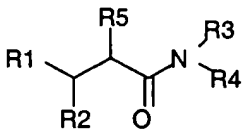
R_4 has one of the meanings of R_3, preferably hydrogen, optionally linear or branched (C_1-C_{12}) alkyl substituted with phenyl, hydroxyl, or halogen, optionally phenyl substituted with halogen or hydroxyl; or

-NR_3R_4 a 5- or 6-membered heterocyclic ring; and

R_5 has one of the meanings specified for R_1 or R_2 as independent substituents,

wherein said method comprises the steps of:

(A) reacting a compound of the general formula (II):



(II)

wherein R_1, R_2, R_3, R_4 and R_5 have the meanings specified above, to introduce protective groups so as to produce a compound of the general formula (III):

wherein R_8 is trialkylsilyl, or (when R_4 = hydrogen) together with R_9 forms the group -C(O)-$(CH_2)_m$-C(O)- and

R_9 (when R_4 = hydrogen) is alkyloxycarbonyl or phenyloxycarbonyl, preferably Boc (= tert. butyloxy-carbonyl); or trialkylsilyl, or together with R_8 the group -C(O)-$(CH_2)_m$-C(O)-, and

m is 0, 1, 2, or 3, preferably 0 or 1, preferably 0,

and in the case in which for the compound of the general formula (II) hydroxyl is present, it is reacted, with a monovalent protective group R_8 and/or R_9;

(B) reacting the compound obtained in step (A) in the presence of (i) a dehydrogenation catalyst and in the presence of (ii) an oxidising agent, such as optionally substituted benzoquinone, allyl methyl carbonate, allyl ethyl carbonate and/or allyl propyl carbonate,

to introduce an α, β-double bond in the α, β-position, and

(C) optionally removing, if present, the protective groups R_8, as well as the substituent R_9.

2. (Original) Method according to claim 1, wherein R_1 and R_2 are independently hydrogen, optionally linear or branched (C_1-C_8) alkyl or (C_1-C_8) alkenyl substituted with hydroxy, phenyl, phenyl substituted with halogen or hydroxy, or with a (C_{1-4}) alkyl ester group or an amide group or (C_{1-4}) alkyl amide group, preferably, phenyl substituted with halogen; preferably linear or branched (C_1-C_8) alkyl or (C_1-C_8) alkenyl, benzyl or phenyl.

3. (Original) Method according to claim 1, wherein R_2 is hydrogen and R_1 is linear or branched (C_1-C_8) alkyl or (C_1-C_8) alkenyl, benzyl or phenyl or Y-R_6.

4. (Original) Method according to claim 1, wherein R_1 is hydrogen and R_2 is linear or branched (C_1-C_8) alkyl or (C_1-C_8) alkenyl; benzyl or phenyl or Y-R_6.

5. (Original) Method according to claim 1, wherein R_1 together with R_3 is directly bonded or forms a group of the formula -$(CH_2)_n$- and n is a whole number from 1 to 12; or R_1 together with R_2 is cyclohexylidene; or R_1 together with R_5 is cyclohexenyl.

6. (Original) Method according to claim 1, wherein Y in the group Y-R_6 is oxygen.

7. (Currently Amended) Method according to claim 1, wherein R_6 is hydrogen, optionally linear or branched (C_1-C_8) alkyl or phenyl substituted with hydroxy, halogen, phenyl, phenyl substituted with halogen, or an (C_{1-4})alkyl ester group or an amide group or a (C_{1-4})alkyl amide group; optionally phenyl substituted with halogen; preferably hydrogen, optionally linear or branched (C_1-C_8) alkyl substituted with phenyl, or with a (C_{1-4}) alkyl ester group or an amide group or a (C_{1-4}) alkyl amide group; or phenyl; preferably hydrogen, linear or branched (C_1-C_8) alkyl or phenyl.

8. (Original) Method according to claim 1, wherein the substituent -N(R_6)(R_7) as heterocyclic ring is a pyrrolidine or piperidine.

9. (Original) Method according to claim 1, wherein the compound of the formula (II) represents a lactam of an omega amino fatty acid, preferably aminobutyric acid, omega aminovaleric acid, omega aminocapronic acid, or omega aminolauric acid.

10. (Original) Method according to claim 1, wherein the compound of the formula (I), R_1 together with R_5 and the incorporated (C=C)-double bond represent a monounsaturated bicyclic ring, preferably a norbornyl group optionally substituted with hydroxyl or amino, preferably a norbornyl group.

11. (Currently Amended) Method according to ~~any of claims 1 to 10~~ claim 1, wherein R_3 and R_4 are independently hydrogen, linear or branched (C_1-C_4) alkyl optionally substituted with phenyl, phenyl; or the group -NR_3R_4 is pyrrolidine or piperidine.

12. (Original) Method according to claim 1, wherein R_5 is hydrogen, tert. butyl or optionally phenyl substituted with halogen or hydroxyl, preferably hydrogen; and R_8 is trimethylsilyl or R_8 together with R_9 is the group -C(O)-(CH_2)$_m$-C(O)-; or R_9 is Boc, trimethylsilyl, or R_9 together

with R_8 is the group -C(O)-$(CH_2)_m$-C(O)-, in which m is 0, 1, 2, or 3, preferably 0 or 1, preferably 0.

13. (Original) Method according to claim 1, wherein R_9 is alkyloxycarbonyl, isobutyloxycarbonyl, tert. butyloxycarbonyl, tertiary amyloxycarbonyl, cyclobutyloxycarbonyl, 1-methylcylobutyloxycarbonyl, cyclopentyloxycarbonyl, cyclohexyloxycarbonyl, 1-methyl-cyclohexyl, preferably tertiary butyloxycarbonyl.

14. (Currently Amended) Method according to ~~one of the claims 1-13~~ claim 1, wherein the dehydrogenation catalyst [in step (B)] is selected from amongst compounds (salts and complexes) of the transition metals of the periodic system, preferably from compounds of the metals of Group VIII elements, in particular from iron, ruthenium and osmium; cobalt, rhodium, and iridium; nickel, palladium and platinum; copper, silver and gold preferably from compounds based on rhodium, palladium and platinum.

15. (Original) Method according to claim 14, wherein the dehydrogenation catalyst is a palladium compound, preferably a Pd(0) compound, preferably a tris(dibenzylidene acetone) dipalladium chloroform complex or a Pd(II) compound, preferably $PdCl_2$, $Pd(dppe)_2$, $Pd(dppe)Cl_2$, $Pd(OAc)_2$, $Pd(dppe)(OAc)_2$, π-allyl Pd complex, preferably π -allyl Pd chloride dimer.

16. (Currently Amended) Method according to ~~one of the claims 1-15~~ claim 1, wherein an additional complexing agent is used for the thermal stabilisation of the palladium complex, preferably 2,2'-bipyridyl or 1,10-phenanthroline.

17. (Currently Amended) Method according to ~~one of the claims 1-16;~~ claim 1, wherein the quinone is a substituted quinone, preferably a quinone substituted with C_{1-4} alkyl, halogen, cyano or nitro.

18. (Currently Amended) ~~Compounds~~ A compound produced according to ~~one of the claims 1-17~~ the method of claim 1.

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Remarks:

The claims have been non-narrowingly amended to remove multiple dependencies to place the claims in conformance with standard U.S. practice. Moreover, the specification has been amended to insert headers in conformance with standard U.S. practice. No new matter has been added to the application.

Should the Examiner have any questions or comments concerning the above, the Examiner is respectfully invited to contact the undersigned at the telephone number given below.

The Commissioner is hereby authorized to charge payment of any additional fees associated with this communication, or credit any overpayment, to Deposit Account No. 08-2461. Such authorization includes authorization to charge fees for extensions of time, if any, under 37 C.F.R § 1.17 and also should be treated as a constructive petition for an extension of time in any future reply pursuant to 37 C.F.R. § 1.136.

Respectfully submitted,

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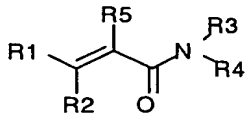
Method for production of α,β-unsaturated amide compounds

The present invention relates to methods for producing α,β-unsaturated amide compounds or methods for introducing an α,β-unsaturated double bond in compounds, which contain an amide grouping by dehydrating the corresponding saturated amide bond in the α,β-position.

The present invention relates to methods for production of α,β-unsaturated amide compounds having the general formula (I):



(I)

wherein

R_1 and R_2 are independently hydrogen; optionally linear or branched (C_1-C_{18}) alkyl or (C_1-C_{18}) alkenyl substituted with hydroxy, halogen, phenyl, substituted phenyl or an ester group [-C(O)OAlkyl] or an amide group [$-C(O)NH_2$ or -C(O)NHAlkyl]; optionally phenyl substituted with halogen; or

R_1 or R_2 is a group $Y-R_6$; wherein

Y is oxygen (-O-); sulphur (-S-); $-NR_7-$; or dialkylsilyloxy [$-(alkyl)_2Si-O-$];

R_6 is hydrogen, linear or branched (C_1-C_{18}) alkyl substituted optionally with hydroxy, halogen, phenyl,